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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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Norio Yabe

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STAAS & HALSEY LLP

SUITE 700

1201 NEW YORK AVENUE, N.W.

WASHINGTON, DC 20005

EXAMINER

LAY, MICHELLE K

ART UNIT

PAPER NUMBER

2628

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DELIVERY MODE

07/11/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/766,838	Applicant(s) YABE ET AL.	
	Examiner MICHELLE K. LAY	Art Unit 2628	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 16 June 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 13-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 13-20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 06/16/2008 has been entered.

Response to Amendment

The amendment filed 06/16/2008 has been entered and made of record. Claims 1-12 have been cancelled. Claims 13-20 are pending.

Response to Arguments

Applicant's arguments filed 06/16/2008 have been fully considered but they are not persuasive. The newly amended claims fail to further limit Applicant's invention. Applicant's arguments do not comply with 37 CFR 1.111(c) because they do not clearly point out the patentable novelty which he or she thinks the claims present in view of the state of the art disclosed by the references cited or the objections made. Further, they do not show how the amendments avoid such references or objections.

Claim Rejections - 35 USC § 101

Claims **17-20** are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. Although the claim language is acceptable, Applicant describes in the disclosure in paragraphs [0041-0042] that the programs *per se* are stored in the portable medium, fixed medium, or ***communication medium*** in a readable manner (emphasis added). Thus, in light of the specification, claims 17-20 recite[s] a signal *per se*. Claims that recite nothing but the physical characteristics of a form of energy, such as a frequency, voltage, or the strength of a magnetic field, define energy or magnetism, *per se*, and as such are nonstatutory natural phenomena. O'Reilly, 56 U.S. (15 How.) at 112-14. Moreover, it does not appear that a claim reciting a signal encoded with functional descriptive material falls within any of the categories of patentable subject matter set forth in §101.

Applicant's arguments filed 09/28/2007 have been fully considered but they are not persuasive. In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., storing each floor of the architectural body as an individual data object) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

1. Claims **13**, **14**, **17**, and **18** stand rejected under 35 U.S.C. 103(a) as being unpatentable over Barros (2004/0119759 A1) and Okude et al. (6,587,784 B1).

In regards to claims **13** and **17**, Barros teaches the following limitations:

- Software for carrying out the method/system of Barros [abstract]
- A data display device comprising: [Fig. 1 (10)]
- A display control unit that distinguishes and displays each data object depending on at least one of the fill area and the number of colors obtained by the obtaining unit as the appearance characteristic. (Barros clearly teaches that the graphical objects can be highlighted or changed as in [0079-0080, 0086, 0090-0097]).
- An obtaining unit that obtains at least one of a fill area and a number of colors for a plurality of data objects to be displayed as a filled area, the fill area and the number of colors being an appearance characteristic of each data object; (Barros teaches an appearance property unit showing a plurality of object sets (layered maps, as in Figure 2b – layers 305-308, Layered Map Set 3a in Figure 3 – plurality object sets shown in map Key 4 in Figure 6a) represented as different symbols – thusly equivalent to a ‘same

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data representation type' on a screen, where the appearance property can be color [0082], that is the system determines the "symbol, pattern, and color" for 'AA' attribute – where if a symbol is opaque or transparent [0090], the effects are calculated and shown, and such items can be highlighted, where the degree of blending is determined by that. Different types of object sets – e.g. terrain features (Figure 6c, hills notation), status of different areas (see Figure 6d) – overlapping areas have different patterns [0092]. Symbols have different sizes based on rating or capacity, such as in Figure 6e, the shown Key. Another good example is Figure 7e, where vegetation type is shown as a function of altitude with the location of the various facilities, again see Key. This therefore teaches the use of a fill area (e.g. different pattern) and color as above. Additionally, each symbol of Barros has fill objects represented in a fill data representation type, as explained above, since such symbols have both color and a pattern applied to them. Obviously changing the color of an object is simply one form of highlighting or emphasis.)

Okude clearly teaches the objects within a map can have their appearance changed based on the number of objects present, e.g. the appearance of a building is shown differently with fewer floors based on the appearance property can clearly represent the **number of floors** and/or similar, as in Figure 11, steps 601a, 602b, 603b, or in Figure 12, steps 601a, 603c, where that determination is made (or Figure 7) – 10:10-30, 11:5-26, 11:55-12:55, 13:1-14:5, and the like. Clearly, the appearance property can be building height and/or **number of floors**, which clearly are "the number of data objects" and/or the like. See – Figure 10, Figures 13A-13B, and the like, clearly

different categories of buildings and rankings exist – navigation landmarks, user-selected groupings and the like as well.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to allow the system of Barros to be able to change the number of objects present to illustrate a data quality, as taught by Okude, because such systems (2:28-3:45, Okude) allow the user to more easily understand of elements of the map having attributes noticeable by a user, such that the appearance property unit alters fill area, colors, and a number of objects to illustrate specific quantities about objects on a map, which would be in keeping with the symbol size notation shown in the key of Barros in Figure 6e, since altering the number of objects makes it easier to comprehend the quantities being depicted, as stated in the cited section of Okude, where obviously changing the color and pattern represent quantities already known to be beneficially varied.

In regards to claims **14** and **18**, claims 14 and 18 recites the same limitations as claims 13 and 17 respectively. Therefore, the same rationale used for claims 13 and 17 is applied. Furthermore, Barros teaches in the various Figures already cited data in a “plot data representation type” as in Figure 3a, 6d, 7e, 7f, 9a, and 9b.

2. Claims **15** and **19** is rejected under 35 U.S.C. 103(a) as unpatentable over Barros (2004/0119759 A1) in view of Okude et al. (6,587,784 B1) and Sakomoto et al (US 2005/0052462 A1).

Barros teaches the limitations of claims 15 and 19 with the exception of teaching line contours. However, in regards to claims 15 and 19, claims 15 and 19 recites the same limitations as claims 13 and 17 respectively. Therefore, the same rationale used for claims 13 and 17 is applied. Furthermore, Sakomoto clearly teaches a “line contour object”, e.g. the road in Figure 6 and in [0023], where Okude also shows roads but does expressly class them as a different kind of object. Sakomoto teaches that it is well known in the art to vary color of objects on a map to emphasize them and to make them more visible [0023]. Changing the color of an object is equivalent to changing its graphical fill, as the term “fill” is well known in the art to mean filling an object with a color. It would be obvious to apply the techniques of Sakomoto to that of Okude, since Okude applies such to mapping software and directions and is clearly an analogous art, and obviously changing the color of an object is simply one form of highlighting or emphasis, and clearly the maps of Okude could have information added to them in the manner of Okude, where such information is obviously of importance to the user (e.g. the location of construction and traffic) and would clearly be advantageous for the user to have ([0196-0198]), and is presented in a manner that is intuitive and easy for the user to understand. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine Sakomoto with Barros/Okude for at least the above reasons.

3. Claims **16** and **20** are rejected under 35 U.S.C. 103(a) as unpatentable over Barros (2004/0119759 A1) in view of Okude et al. (6,587,784 B1), McQuarrie et al (6,658,375 B1) and Pearce (2005/0099321 A1).

Barros teaches the limitations of claims 16 and 20 with the exception of teaching vector lines. However, in regards to claims 15 and 19, claims 15 and 19 recites the same limitations as claims 13 and 17 respectively. Therefore, the same rationale used for claims 13 and 17 is applied. Furthermore, McQuarrie clearly teaches the output of various simulations as being output as a plot output, and further as a vector map overlaid onto a contour plot and a plot diagram generally (Figures 5-8c, and 24:55-25:11), where these are clearly well known forms in which data could be output. Clearly, when a vector plot is overlaid onto a contour plot, it would be desirable that the vector map not occludes the contour map. Next, it is obvious that many types of information, particularly average traffic speeds (e.g. traffic jam information) could be provided in vector format to the user with the direction of traffic being indicated by vector format, where vector data is more intuitive to the user and makes it easier to grasp patterns, where it is known to overlay traffic speed information on roads on a map in for example a navigation unit in an automobile. See Pearce [0053], to provide better information to the user on unsafe or unusual traffic situations and provide more accurate routing information, where vector format would be easier for the user to understand since the views of roads could be obscured by buildings and the like in the system of Okude. Clearly, the system of Pearce provides such data and coloring and overlay on maps, and McQuarrie illustrates and teaches how such data format in vector format is

more useful to users and the like. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Okude to: 1) show traffic information as per the Pearce reference in the manner described in overlay format and 2) to show such information in vector format as per the McQuarrie reference.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michelle K. Lay whose telephone number is (571) 272-7661. The examiner can normally be reached on Monday-Friday 7:30a-5p.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kee M. Tung can be reached on (571) 272-7794. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Michelle K. Lay/
Examiner, Art Unit 2628
07.03.2008 /mkl/

/Kee M Tung/
Supervisory Patent Examiner, Art
Unit 2628